6560-50-P

# **ENVIRONMENTAL PROTECTION AGENCY**

#### **40 CFR Part 52**

[EPA-R03-OAR-2012-0753; FRL-9910-32-Region 3]

Approval and Promulgation of Air Quality Implementation Plans; Pennsylvania; Determination of Attainment of the 2006 24-Hour Fine Particulate Matter Standard for the Pittsburgh-Beaver Valley Nonattainment Area

**AGENCY:** Environmental Protection Agency (EPA).

**ACTION:** Final rule.

**SUMMARY:** The Environmental Protection Agency (EPA) is making a determination of attainment regarding the Pittsburgh-Beaver Valley, Pennsylvania fine particulate matter (PM<sub>2.5</sub>) nonattainment area (hereafter referred to as "the Pittsburgh Area" or "the Area"). EPA has determined that the Pittsburgh Area has attained the 2006 24-hour PM<sub>2.5</sub> National Ambient Air Quality Standard (NAAQS), based upon quality-assured and certified ambient air monitoring data for 2010-2012. Preliminary data for 2013 show that the area continues to attain the standard. This determination of attainment suspends the requirements for the Pittsburgh Area to submit an attainment demonstration and associated reasonably available control measures (RACM), a reasonable further progress (RFP) plan, contingency measures, and other planning State Implementation Plan (SIP) revisions related to the attainment of the standard for so long as the Area continues to attain the 2006 24-hour PM<sub>2.5</sub> NAAQS. This action does not constitute a redesignation to attainment under section 107(d)(3) of the Clean Air Act (CAA). The designation status of the Pittsburgh Area will remain nonattainment for the 2006 24-hour PM<sub>2.5</sub> NAAOS until such time as EPA determines that the Pittsburgh Area meets the CAA requirements for redesignation to attainment, including an approved maintenance plan. EPA is also approving the 2011 motor vehicle emission budgets (MVEBs) used for transportation

conformity purposes for the Pittsburgh Area. This action is being taken under the CAA.

**DATES:** This final rule is effective on [insert date of publication in the Federal Register].

ADDRESSES: EPA has established a docket for this action under Docket ID Number EPA-R03-OAR-2012-0753. All documents in the docket are listed in the <a href="www.regulations.gov">www.regulations.gov</a>
website. Although listed in the electronic docket, some information is not publicly available, i.e., confidential business information (CBI) or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available either electronically through <a href="www.regulations.gov">www.regulations.gov</a> or in hard copy for public inspection during normal business hours at the Air Protection Division, U.S. Environmental Protection Agency, Region III, 1650 Arch Street, Philadelphia, Pennsylvania 19103.

**FOR FURTHER INFORMATION CONTACT**: Gregory Becoat, (215) 814-2036, or by email at becoat.gregory@epa.gov.

**SUPPLEMENTARY INFORMATION:** 

## I. Background

On November 13, 2009, EPA published designations for the 2006 24-hour PM<sub>2.5</sub> NAAQS (74 FR 58688), which included the Pittsburgh Area as a nonattainment area. Designations became effective on December 14, 2009. The Pittsburgh Area consists of Beaver, Butler, and Westmoreland Counties, and portions of Allegheny (not including the townships which are part

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of the Liberty-Clairton nonattainment area), Armstrong, Green, and Lawrence Counties. This final determination of attainment only addresses the 2006 24-hour PM<sub>2.5</sub> NAAQS for the Pittsburgh Area.

On August 14, 2013 (78 FR 49403), EPA published a notice of proposed rulemaking (NPR) seeking comment on EPA's proposed determination that the Pittsburgh Area has attained the 2006 24-hour PM<sub>2.5</sub> NAAQS, based on the quality-controlled, quality-assured, and certified data from 2010-2012, and EPA's proposed approval of the 2011 MVEBs for transportation conformity purposes for the Pittsburgh Area. In response to the NPR, EPA received two comments, one dated September 10, 2013 from Mr. Harold Peterson and the other dated September 13, 2013 from Mr. Joseph Minott representing the Clean Air Council. A summary of the comments and EPA's response is provided in Section III (Summary of Public Comment and EPA Response) of this final rulemaking action.<sup>1</sup>

# II. Summary of Rulemaking Actions

EPA is making a final determination that the Pittsburgh Area has attained the 2006 24-hour PM<sub>2.5</sub> NAAQS. This "clean data" determination is based upon quality assured and certified ambient air monitoring data that show the area has monitored attainment of the 2006 24-hour PM<sub>2.5</sub> NAAQS for the 2010-2012 monitoring period. Quality-assured data for 2013 indicates that the Area continues to attain the 2006 24-hour PM<sub>2.5</sub> NAAQS. Table 1 is a summary of publicly available information, which is available at <a href="http://www.epa.gov/airdata/">http://www.epa.gov/airdata/</a>.

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<sup>&</sup>lt;sup>1</sup> Because the attainment date has not passed, this action is limited to a clean data determination and is not a determination of attainment pursuant to section 179(c)(1) of the CAA.

Table 1. Pittsburgh Area's 2013 24-hour PM <sub>2.5</sub> Air Quality Data in micrograms per cubic meter (μg/m <sup>3</sup> )						
County	AQS Site	Site Name	2013 98th	2013 24 hour		
	ID		Percentile	Design Value		
Allegheny	420030002	AVALON	23	25		
Allegheny	420030008		21	23		
		LAWRENCEVILLE				
Allegheny	420030067	SOUTH FAYETTE	24	24		
Allegheny	420030093	NORTH PARK	16	19		
Allegheny	420031008	HARRISON	24	25		
Allegheny	420031301	NORTH	26	29		
		BRADDOCK				
Armstrong	420050001	KITTANNING	23	24		
Beaver	420070014	BEAVER FALLS	24	26		
Washington	421250005	CHARLEROI	22	25		
Washington	421250200	WASHINGTON	21	23		
Washington	421255001	FLORENCE	21	16		
Westmorland	421290008	GREENSBURG	23	26		

As a result of this determination, the requirement for the Pittsburgh Area to submit an attainment demonstration and associated RACM, RFP, contingency measures, and other planning SIP revisions related to the attainment of the 2006 24-hour PM<sub>2.5</sub> NAAQS shall be suspended for so long as the Area continues to attain the 2006 24-hour PM<sub>2.5</sub> NAAQS.<sup>2</sup> This determination of attainment does not constitute a redesignation of the Pittsburgh Area to attainment for the 2006 24-hour PM<sub>2.5</sub> NAAQS under CAA section 107(d)(3). This rulemaking action does not involve approving a maintenance plan for the Pittsburgh Area, nor determines that the Pittsburgh Area has met all the requirements for redesignation under the CAA, including that the attainment be due to permanent and enforceable measures. Therefore, the designation status of the Pittsburgh Area will remain nonattainment for the 2006 24-hour PM<sub>2.5</sub> NAAQS until such time as EPA takes final rulemaking action to determine that the Pittsburgh Area meets the CAA requirements

<sup>&</sup>lt;sup>2</sup> Even though the requirements are suspended, EPA is not precluded from acting upon these elements at any time if submitted to EPA for review and approval.

for redesignation to attainment.

EPA is also approving the 2011 MVEBs for transportation conformity purposes for the Pittsburgh Area. The rationale for EPA's proposed action is explained in the NPR and will not be restated here. Relevant support documents for this action are available online at <a href="https://www.regulations.gov">www.regulations.gov</a>, Docket number EPA-R03-OAR-2012-0753.

#### III. Summary of Public Comment and EPA Response

Comment: The commenter endorsed EPA's proposed approval and stated that the determination to attainment is appropriate. The commenter stated that although the monitoring sites do not demonstrate a decrease in PM<sub>2.5</sub> levels, all monitoring sites have achieved the appropriate attainment levels for the 2006 PM<sub>2.5</sub> NAAQS. Further, the commenter supported approval of the MVEBs. The commenter references a monitoring study that he undertook which found that on-road mobile sources were the greatest contributor to nitrogen oxides (NOx). The commenter believes that the NOx MVEBs are appropriate and "should not result in PM<sub>2.5</sub> nonattainment."

**Response:** EPA agrees with the commenter's conclusion that the determination of attainment is appropriate based upon quality-assured and certified ambient air monitoring data for 2010-2012, and subsequent data that shows the Area continues to attain the standard. Moreover, EPA agrees that the established MVEBs will not cause or contribute to violations of any NAAQS or delay timely attainment of any NAAQS.

Comment: By letter dated September 13, 2013, Mr Joseph Minott, on behalf of the Clean Air Council (the Council), submitted comments which focused upon EPA's use of the "maximum quarterly substitution test" for certain incomplete sampling periods at several monitors. The Council commented that EPA's guidelines allow for maximum quarter substitutions as long as emissions and meteorology of the quarter(s) in question are typical. The Council requested that EPA explain in more detail how the substituted quarters were found to have typical, comparable, and/or consistent meteorology. In making this request, the Council expressed concern that EPA's guidelines had not laid out criteria or set of conditions that must be met in order for substituted samples to be considered as having occurred during comparable meteorology/emissions periods. Further, the Council voiced a concern about how this method could be applied to ensure consistent results.

Response: As explained in the NPR, for EPA to determine that the Pittsburgh Area has attained the 2006 24-hour PM<sub>2.5</sub> NAAQS, the 24-hour design value of the Pittsburgh Area must be less than the standard, 35 μg/m³. EPA has promulgated regulations which set forth the procedures for determining when the 24-hour PM<sub>2.5</sub> NAAQS has been met. *See* 40 CFR 50, appendix N (appendix N). The 24-hour design value determined for an area is the highest three-year average of the annual 98<sup>th</sup> percentile measured at all the monitors. Only valid and complete air quality data can be used for comparison to the 2006 24-hour PM<sub>2.5</sub> NAAQS. As provided in 40 CFR 50, appendix N, section 4.2 (appendix N, section 4.2), a year meets data completeness requirements when at least 75 percent of the scheduled sampling days for each quarter have valid data. As explained in the NPR, several monitors in the Pittsburgh Area did not meet the completeness requirement during one or more quarters in 2010-2012. EPA addressed such missing data by

applying the maximum quarterly substitution test which is described in the NPR. The NPR's discussion of the use of the maximum quarterly substitution test refers to EPA's April 1999 guidance document "Guideline on Data Handling Conventions for the PM NAAQS" (1999 PM NAAQS Data Handling Guidelines). The Council in its comment seeks additional information relating to EPA's application of these guidelines in the context of reviewing the monitoring data for the Pittsburgh Area.

EPA's reference in the NPR to the PM NAAQS Data Handling Guidelines in the NPR was outdated, since the guidance has been superseded by a regulatory provision in 40 CFR 50 appendix N. On January 15, 2013, appendix N was revised to add two additional tests which assess data completeness issues for PM<sub>2.5</sub> NAAQS, including a revised version of the maximum quarterly substitution test described in the NPR. See National Ambient Air Quality Standards for Particulate Matter, 78 FR 3086, 3228-3232 and 3277-3281 (January 15, 2013). Thus, rather than referencing the 1999 PM NAAQS Data Handling Guidelines, the NPR should have referred to appendix N, section 4.2. As explained in the January 15, 2013 final rule: "With regard to assessments of data completeness, the EPA proposal included two additional data substitution tests . . . into appendix N for validating annual and 24-hour PM<sub>2.5</sub> design values otherwise deemed incomplete . . . The EPA proposed to add these tests in order to codify existing practices currently included in guidance documents (U.S. EPA, 1999) and implemented as EPA standard operating procedures, and further to make the data handling procedures for PM<sub>2.5</sub> more consistent with the procedures used for other NAAQS." See id. at 3230. Therefore, the guidance document cited in the NPR has been superseded by the revision and codification of such guidelines in appendix N.

As revised, appendix N, section 4.2 provides that: "where the explicit 75 percent quarterly data capture requirement is not met, the 24-hour PM<sub>2.5</sub> NAAQS shall still be considered valid if it passes the maximum quarterly value data substitution test (maximum quarterly substitution test)." See Appendix N, section 4.2(b). The maximum quarterly substitution test is defined at appendix N, section 4.2(c)(i) and the procedures for applying this test are set forth there as well: "Identify for each deficient quarter (i.e., those with less than 75 percent but at least 50 percent data capture) the highest reported daily PM<sub>2.5</sub> value for that quarter, excluding state-flagged data affected by exceptional events which have been approved for exclusion by the Regional Administrator, looking across those three quarters of all three years under consideration." In reviewing the monitoring data for the Pittsburgh Area in preparation of the NPR, EPA applied and followed the procedures set forth in appendix N, section 4.2. In the NPR, EPA erroneously referenced the PM NAAQS Data Handling Guidelines, rather than appendix N, section 4.2. Although the 1999 guidelines included procedures for comparing meteorology or emissions of the quarters in question, the regulatory successor to the guidelines, codified in appendix N, do not require EPA to determine whether the meteorology or emissions of the quarters in question are comparable.

Notwithstanding the fact that the current regulations no longer require the analysis requested by the Council, because EPA's proposal erroneously referred to the guidelines, EPA is providing herein a detailed discussion of the comparison of the meteorology for the one of the monitors at issue (the North Park monitor) as would have been appropriate prior to January 2013, when the referenced guidelines were relevant and applicable. EPA is also providing a summary of the meteorological data comparison for the remaining monitors.

As discussed in the NPR, the following four monitors in the Pittsburgh Area did not meet the completeness requirement for one or more quarters during 2010-2012 monitoring period and EPA addressed the missing data from these monitors by applying the maximum quarter substitution test: 1) North Park monitor; 2) Harrison monitor; 3) North Braddock monitor; and, 4) Charleroi monitor. For each quarter where there was missing data at each of these four monitors, EPA determined the highest reported daily PM<sub>2.5</sub> value for that quarter across the three years under consideration (2010 - 2012) and substituted that value for the missing data for such quarter. For example, the North Park monitor, in Allegheny County, Pennsylvania had missing data for the first quarters of 2010, 2011, and 2012. EPA determined that, during the first quarter of these years, the maximum quarterly 24-hour monitoring concentration of 26.5 µg/m<sup>3</sup> occurred on March 9, 2010. Using this value (26.5 µg/m<sup>3</sup>) as a substitute value, EPA recalculated the design value for the first quarters of 2010, 2011, and 2012 at this monitor to determine if, using the substituted data, the re-calculated design value would be below the PM<sub>2.5</sub> NAAQS. In accordance with appendix N, section 4.2, this process was repeated for each monitor for each quarter where there was missing data.

In response to the Council's request for additional meteorological comparative data, for the North Park monitor meteorological similarity analysis, meteorological data from the Pittsburgh International Airport was reviewed to determine meteorological similarity between the first quarter of 2010 (i.e. the substitute quarter) and the first quarters of 2011 and 2012 during which there was missing monitoring data at the North Park monitor. Quarterly averages and standard deviations of meteorological variables, such as average temperature, average precipitation, and average maximum and minimum temperature, were calculated from meteorological data

downloaded from the Pennsylvania State Climatologist website.<sup>3</sup> Meteorological variables included daily averaged temperatures, wind speeds and humidity levels, daily maximum and minimum temperatures, and monthly precipitation. First quarter meteorological variables for 2010, 2011, and 2012 were similar as all of the variables fell within a common standard deviation. This observation indicates that no large differences in meteorology occurred at the North Park monitor between the dates of missing data in the first quarters of 2011 and 2012 and the first quarter of 2010, the quarter during which the highest reported daily PM<sub>2.5</sub> value for such quarters was recorded across the first quarter of the three years under consideration (2010 -2012). Because there were also data deficiencies during the second quarter of this time period at the North Park monitor, an identical meteorological similarity analysis was done for the North Park monitor for the second quarter of 2010 through 2012. The results of the meteorological similarity analysis for the 2010-12 second quarters were similar to the results for the first quarter results and indicated that there were no large meteorological differences at the North Park monitor, during the time period subject to analysis.

With the exception of the Charleroi monitor, for each quarter during which there was missing data at each of the remaining monitors, EPA conducted similar analyses of meteorological data. The meteorological similarity analysis for the Harrison and North Braddock monitors used meteorological data from the Allegheny County Airport, which is the closest National Weather Service station to the monitors. The Harrison monitor used substituted  $PM_{2.5}$  concentrations for missing data in the second quarters of 2010, 2011, and 2012. The North Braddock monitor used substituted PM<sub>2.5</sub> concentrations for missing data in the second and fourth quarters of 2010,

http://climate.psu.edu/, http://climate.psu.edu/data/ida/index.php?t=3&x=faa\_daily&id=KPIT http://climate.psu.edu/data/ida/index.php?t=3&x=faa\_daily&id=KAGC

2011, and 2012. After reviewing the meteorological data for the Harrison and North Braddock monitors, EPA determined that the data was similar. In the case of the Charleroi monitor, the highest reported daily PM<sub>2.5</sub> value (the substitute data value) occurred during the same time frame (same quarter and year) as the data deficiencies. Since, the date where there was missing data and the date on which the substitute value was recorded fell during the same quarter of the same year, a meteorological similarity analysis would not have been required under the 1999 guidelines, even if they were applicable.

In response to the Council's comment, EPA reviewed the relevant meteorology data for the Pittsburgh Area as referenced in the guidelines which were erroneously referenced in the NPR and which have been superseded by revised appendix N. With respect to the applicable regulatory requirements, EPA's data analysis, including the application of the maximum quarterly substitution test, to determine whether the monitoring data demonstrates that the Pittsburgh Area attained the 2006 PM<sub>2.5</sub> NAAQS during 2010 through 2012, was completed in accordance with the applicable regulatory requirements set forth at 40 CFR 50, appendix N. Although the 1999 guidelines no longer apply to the maximum quarterly substitution test that EPA used here, because the revised regulatory provision of appendix N superseded such guidelines, EPA's analysis, as set forth here in response to the commenter's request, satisfies the provisions of both the prior guidelines and the currently applicable regulation in revised appendix N. Therefore, EPA's conclusion, that the maximum quarterly substitution test used for the data analysis is valid, is fully supported by both the prior and current provisions that apply. EPA's analysis of the meteorological comparison and other elements no longer required under the current regulation, is set forth solely to address the concerns raised by the commenter.

#### IV. Final Action

EPA is making a determination that the Pittsburgh Area is attaining the 2006 24-hour PM<sub>2.5</sub> NAAQS, based on quality-assured and certified ambient air monitoring data for the 2010-2012 monitoring period. Quality-assured data for 2013 summarized in Table 1 show that the Area continues to attain the standard. This final determination suspends the requirements for the Pittsburgh Area to submit an attainment demonstration and associated RACM, RFP plan, contingency measures, and other planning SIP revisions related to the attainment of the standard, for so long as the Area continues to attain the 2006 24-hour PM<sub>2.5</sub> NAAQS. This determination does not constitute a redesignation of the Pittsburgh Area to attainment. The Pittsburgh Area will remain designated nonattainment for the 2006 24-hour PM<sub>2.5</sub> NAAQS until such time as EPA determines that the Pittsburgh Area meets the CAA requirements for redesignation to attainment, including an approved maintenance plan. EPA is also approving the MVEBs for the 2006 24-hour PM<sub>2.5</sub> NAAQS. The new MVEBs must be used for future transportation conformity determinations. The 2011 MVEBs will be effective on the date of publication of this final rulemaking action in the Federal Register.

#### V. Statutory and Executive Order Reviews

#### A. General Requirements

This action, which makes a determination of attainment based on air quality, will result in the suspension of certain Federal requirements and/or will not impose any additional requirements beyond those imposed by state law. For that reason, this action:

• is not a "significant regulatory action" subject to review by the Office of Management and Budget under Executive Order 12866 (58 FR 51735, October 4, 1993);

- does not impose an information collection burden under the provisions of the Paperwork
   Reduction Act (44 U.S.C. 3501 et seq.);
- is certified as not having a significant economic impact on a substantial number of small entities under the Regulatory Flexibility Act (5 U.S.C. 601 et seq.);
- does not contain any unfunded mandate or significantly or uniquely affect small governments, as described in the Unfunded Mandates Reform Act of 1995 (Public Law 104-4);
- does not have Federalism implications as specified in Executive Order 13132 (64 FR 43255, August 10, 1999);
- is not an economically significant regulatory action based on health or safety risks subject to Executive Order 13045 (62 FR 19885, April 23, 1997);
- is not a significant regulatory action subject to Executive Order 13211 (66 FR 28355, May 22, 2001);
- is not subject to requirements of Section 12(d) of the National Technology Transfer and Advancement Act of 1995 (15 U.S.C. 272 note) because application of those requirements would be inconsistent with the CAA; and
- does not provide EPA with the discretionary authority to address, as appropriate,
   disproportionate human health or environmental effects, using practicable and legally
   permissible methods, under Executive Order 12898 (59 FR 7629, February 16, 1994).

In addition, this rulemaking action does not have tribal implications as specified by Executive Order 13175 (65 FR 67249, November 9, 2000), because the determination is not approved to

apply in Indian country located in the state, and EPA notes that it will not impose substantial direct costs on tribal governments or preempt tribal law.

## B. Submission to Congress and the Comptroller General

The Congressional Review Act, 5 U.S.C. 801 et seq., as added by the Small Business Regulatory Enforcement Fairness Act of 1996, generally provides that before a rule may take effect, the agency promulgating the rule must submit a rule report, which includes a copy of the rule, to each House of the Congress and to the Comptroller General of the United States. EPA will submit a report containing this action and other required information to the U.S. Senate, the U.S. House of Representatives, and the Comptroller General of the United States prior to publication of the rule in the Federal Register. A major rule cannot take effect until 60 days after it is published in the Federal Register. This action is not a "major rule" as defined by 5 U.S.C. 804(2).

#### C. Petitions for Judicial Review

Under section 307(b)(1) of the CAA, petitions for judicial review of this action must be filed in the United States Court of Appeals for the appropriate circuit by [Insert date 60 days from date of publication of this document in the Federal Register]. Filing a petition for reconsideration by the Administrator of this final rule does not affect the finality of this action for the purposes of judicial review nor does it extend the time within which a petition for judicial review may be filed, and shall not postpone the effectiveness of such rule or action.

This action, approving the determination of attainment of the Pittsburgh Area with respect to the

2006 24-hour PM<sub>2.5</sub> NAAQS and the MVEBs, may not be challenged later in proceedings to

enforce its requirements. (See section 307(b)(2).).

List of Subjects in 40 CFR Part 52

Environmental protection, Air pollution control, Incorporation by reference, Particulate matter,

Reporting and recordkeeping requirements.

Dated: April 18, 2014.

W. C. Early, Acting Regional Administrator,

Region III.

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40 CFR part 52 is amended as follows:

#### PART 52 – APPROVAL AND PROMULGATON OF IMPLEMENTATION PLANS

1. The authority citation for part 52 continues to read as follows:

Authority: 42 U.S.C. 7401 et seq.

## **Subpart NN -- Pennsylvania**

2. Section 52.2059 is amended by adding paragraph (j) to read as follows:

§ 52.2059 Control strategy: Particulate matter.

\* \* \* \* \*

(j) Determination of Clean Data. EPA has determined, as of [Insert date of publication in the Federal Register], that based on 2010-2012 ambient air quality data, the Pittsburgh-Beaver Valley, Pennsylvania fine particulate matter (PM<sub>2.5</sub>) nonattainment area has attained the 2006 24-hour PM<sub>2.5</sub> national ambient air quality standards (NAAQS) and approves the motor vehicle emission budgets used for transportation conformity purposes. This determination suspends the requirements for the Pittsburgh-Beaver Valley, Pennsylvania PM<sub>2.5</sub> nonattainment area to submit an attainment demonstration, associated reasonably available control measures, a reasonable further progress plan, contingency measures, and other planning SIPs related to attainment of the standard for as long as this area continues to meet the 2006 24-hour PM<sub>2.5</sub> NAAQS. If EPA determines, after notice-and-comment rulemaking, that this area no longer meets the 2006 24-hour PM<sub>2.5</sub> NAAQS, the corresponding determination of attainment for that area shall be withdrawn.

# PITTSBURGH-BEAVER VALLEY'S MOTOR VEHICLE EMISSION BUDGETS FOR $THE~2006~PM_{2.5}~NAAQS$

Geographic Area	Year	PM <sub>2.5</sub> (tons/year)	NOx (tons/year)
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Pittsburgh Area	2011	961.71	28,973.05

[FR Doc. 2014-10114 Filed 05/01/2014 at 8:45 am; Publication Date: 05/02/2014]